Here's the functional hierarchy for each role, formatted as it would appear in a Scope of Work document:

Functional Hierarchy: Student Athlete

1. Account Management

- **Login/Signup:**
  - Implement secure authentication using username/password and social login options (e.g., Google, Facebook).
  - Develop a user-friendly account creation process that captures basic profile information (name, age, school, sport).
  - Include password recovery/reset functionality with email verification.
- **Profile Management:**
  - Allow users to update their personal information (name, age, school, sport, etc.).
  - Implement privacy settings for data sharing, allowing users to control which information is visible to others.
  - Provide an option to link external accounts (e.g., fitness trackers) for data synchronization.
- **Logout:**
  - Implement secure session termination upon logout, ensuring user data is protected.

2. Dashboard

- **Personalized Overview:**
  - Develop a visually appealing dashboard that displays progress tracking for key areas (fitness, nutrition, sleep, stress, substance use).
  - Utilize charts and graphs to visualize trends and achievements over time.
  - Implement notifications for upcoming events, challenges, or reminders.
- **Quick Access to Features:**
  - Provide clear links to specific modules (fitness tracker, nutrition log, mental health resources).
  - Include shortcuts to frequently used content for easy navigation.

3. Wellness Modules

- **Physical Fitness:**
  - Implement activity tracking features to record steps, distance, and calories burned.
  - Develop a workout logging system to capture type, duration, and intensity of exercises.
  - Provide exercise recommendations based on sport and individual goals, utilizing personalized algorithms.
  - Integrate with popular fitness trackers (optional) for seamless data synchronization.
- **Nutrition:**
  - Develop a food diary feature to track meals, snacks, and hydration levels.
  - Provide nutritional information (calories, macronutrients, vitamins) for each food item.
  - Offer personalized meal plans (optional) based on dietary needs and goals.
  - Include a library of recipes and healthy eating tips.
- **Sleep:**
  - Implement sleep tracking features to record sleep duration and quality.
  - Provide sleep hygiene tips and recommendations for improving sleep habits.
  - Allow users to manage their sleep schedule and set reminders.
- **Stress Management:**
  - Develop a stress level tracking system to monitor mood, anxiety, and tension levels.
  - Include relaxation techniques (breathing exercises, mindfulness) and guided meditations.
  - Provide access to stress management resources (articles, videos) for coping strategies.
- **Substance Prevention:**
  - Provide comprehensive information about substance use risks and consequences.
  - Offer strategies for resisting peer pressure and making healthy choices.
  - Include resources for help and support (hotlines, websites) for those struggling with substance use.

4. Resources & Education

- **Local & National Resources:**
  - Develop a directory of relevant organizations, support groups, and hotlines.
  - Include information about local events and programs related to wellness and prevention.
- **Educational Content:**
  - Create a library of articles, videos, and interactive modules on wellness topics.
  - Implement quizzes and assessments to test user knowledge and provide feedback.
- **Personalized Recommendations:**
  - Develop an algorithm to suggest content based on individual interests and needs.

5. Community & Support

- **Social Features:**
  - Implement social features (optional) to connect with other student athletes.

- Allow users to share progress and achievements with their peers.
- Enable participation in group challenges and competitions.
- **Messaging:**
  - Develop a messaging system (optional) for communication with coaches and support staff.
  - Allow users to ask questions and receive guidance from trusted individuals.

6. Feedback & Reporting

- **Surveys & Assessments:**
  - Implement surveys and assessments to gather feedback on app experience and content.
  - Track user progress and identify areas for improvement.
- **Reporting:**
  - Develop reporting features (optional) to generate reports on individual and group performance.
  - Allow users to share data with coaches and DSCYF/DPBHS (with consent).

Functional Hierarchy: Coach/Athletic Director

1. Account Management

- **Login/Signup:**
  - Implement secure authentication using username/password.
  - Develop a user-friendly account creation process that captures school affiliation and coaching role.
  - Include password recovery/reset functionality with email verification.
- **Profile Management:**
  - Allow users to update their personal information (name, school, coaching role, etc.).
  - Implement privacy settings for data sharing.
- **Logout:**
  - Implement secure session termination upon logout.

2. Dashboard

- **Team Overview:**
  - Develop a dashboard that displays student athlete progress and performance data.
  - Implement features to identify athletes needing additional support or guidance.
  - Track team participation and engagement with the app.
- **Communication Tools:**
  - Develop a messaging system to send messages to individual athletes or the entire team.
  - Implement features to create announcements and reminders.
- **Resource Management:**
  - Provide access to a library of relevant resources for coaches and athletes.
  - Allow coaches to customize content for specific sports or needs.

3. Student Athlete Management

- **View Individual Profiles:**
  - Allow coaches to access student athlete data (progress, activity, resources accessed).
  - Implement features to monitor engagement and identify areas for improvement.
- **Assign Tasks & Challenges:**
  - Develop a system for coaches to set goals and challenges for individual athletes or the team.
  - Track progress and provide feedback to athletes.
- **Communication:**
  - Enable coaches to send personalized messages to individual athletes.
  - Provide a platform for coaches to respond to athlete questions and concerns.

4. Resource Management

- **Content Library:**
  - Develop a content library for coaches to access and manage educational content.
  - Allow coaches to add local resources and links.
  - Implement features to customize content for specific sports or needs.
- **Sharing Tools:**
  - Enable coaches to share resources with athletes individually or as a team.
  - Allow coaches to create custom content playlists.

5. Reporting & Analytics

- **Team Performance Data:**

- Develop reporting features to view aggregated data on team progress and engagement.
- Implement analytics to identify trends and areas for improvement.
- **Individual Athlete Reports:**
  - Generate reports on individual athlete progress and performance.
  - Allow coaches to share reports with athletes and parents (with consent).
- **Feedback & Insights:**
  - Gather feedback from athletes on app experience and content.
  - Utilize data to improve the app and program effectiveness.

Functional Hierarchy: DSCYF/DPBHS Staff

1. Account Management

- **Login/Signup:**
  - Implement secure authentication using username/password.
  - Develop a user-friendly account creation process that captures DSCYF/DPBHS affiliation.
  - Include password recovery/reset functionality with email verification.
- **Profile Management:**
  - Allow users to update their personal information (name, role, etc.).
  - Implement privacy settings for data sharing.
- **Logout:**
  - Implement secure session termination upon logout.

2. Content Management

- **Resource Library:**
  - Develop a content library for DSCYF/DPBHS staff to access and manage educational content.
  - Allow staff to add local resources and links.
  - Implement a content approval process to ensure quality and relevance.
- **Content Categorization:**
  - Implement features to organize content by topic, age group, or sport.
  - Allow staff to create custom content playlists for specific needs.
- **Content Scheduling:**
  - Develop a system for scheduling content to be released at specific times.
  - Implement features to create targeted content campaigns.

3. Data & Analytics

- **App Usage Data:**
  - Collect and analyze aggregated data on app usage and engagement.
  - Track user demographics and activity patterns.
  - Implement analytics to identify trends and areas for improvement.
- **Student Athlete Data:**
  - Access anonymized data on student athlete progress and performance.
  - Utilize data to evaluate program effectiveness and identify areas for support.
- **Reporting:**
  - Generate reports on app usage, content performance, and student athlete outcomes.
  - Share reports with stakeholders and funders.

4. Program Management

- **Manage User Accounts:**
  - Create and manage user accounts for coaches, athletes, and other stakeholders.
  - Assign roles and permissions to control access levels.
  - Manage user groups and access levels.
- **Communication Tools:**
  - Develop a messaging system to send messages to coaches and athletes.
  - Implement features to create announcements and reminders.
- **Feedback & Support:**
  - Gather feedback from coaches and athletes on app experience and content.
  - Provide technical support and troubleshooting assistance.

Functional Hierarchy: App Administrator

1. Account Management

- **Login/Signup:**
  - Implement secure authentication using username/password.
  - Develop a user-friendly account creation process with administrator privileges.
  - Include password recovery/reset functionality with email verification.
- **Profile Management:**
  - Allow users to update their personal information (name, role, etc.).
  - Implement privacy settings for data sharing.
- **Logout:**
  - Implement secure session termination upon logout.

2. System Management

- **User Management:**
  - Develop a system for creating, editing, and deleting user accounts for all roles.
  - Implement features to assign roles and permissions.
  - Manage user groups and access levels.
- **Content Management:**
  - Manage the app's content library, including adding, editing, and deleting content.
  - Implement a content approval process.
  - Control content visibility and access for different user roles.
- **Data Management:**
  - Manage user data and privacy settings.
  - Implement data security measures to protect sensitive information.
  - Configure data reporting and analytics.
- **App Updates:**
  - Manage app updates and releases.
  - Monitor app performance and stability.
  - Implement bug fixes and feature enhancements.

3. Security & Compliance

- **Authentication & Authorization:**
  - Implement secure authentication and authorization protocols.
  - Manage user access and permissions.
- **Data Encryption:**
  - Encrypt sensitive user data at rest and in transit.
  - Implement data security best practices.
- **Compliance:**
  - Ensure compliance with relevant privacy regulations (e.g., GDPR, HIPAA).
  - Implement security audits and vulnerability assessments.

4. Monitoring & Analytics

- **App Performance Monitoring:**
  - Track app usage, performance, and stability.
  - Identify and resolve technical issues.
- **User Behavior Analytics:**
  - Analyze user behavior and engagement patterns.
  - Identify areas for improvement and optimization.
- **Reporting:**
  - Generate reports on app performance, user activity, and security events.

This detailed functional hierarchy, presented in a Scope of Work format, provides a clear and comprehensive outline of the technical requirements for each role in the mobile app. It ensures that the development team understands the specific functionalities needed for each user group, leading to a successful and effective app implementation.